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NOTICE OF ALLOWANCE AND FEE(S) DUE

22434 7590 BEYER WEAVER LLP P.O. BOX 70250 09/17/2008

09/17/200

EXAMINER
HALIYUR, VENKATESH N

ART UNIT PAPER NUMBER

2619 DATE MAILED: 09/17/2008

P.O. BOX 70250 OAKLAND, CA 94612-0250

 APPLICATION NO.
 FILING DATE
 FIRST NAMED INVENTOR
 ATTORNEY DOCKET NO.
 CONFRIMATION NO.

 09/691,419
 1017/2000
 Gordon MacKay
 CISCP261
 4308

TITLE OF INVENTION: METHOD AND APPARATUS TO DETECT AND BREAK LOOP CONFIGURATION

| APPLN. TYPE | SMALL ENTITY | ISSUE FEE DUE | PUBLICATION FEE DUE | PREV. PAID ISSUE FEE | TOTAL FEE(8) DUE | DATE DUE |
|----------------|--------------|---------------|---------------------|----------------------|------------------|------------|
| nonprovisional | NO | \$1440 | \$0 | \$0 | \$1440 | 12/17/2008 |

THE APPLICATION IDENTIFIED ABOVE HAS BEEN EXAMINED AND IS ALLOWED FOR ISSUANCE AS A PATENT. PROSECUTION ON THE MERITS IS CLOSED. THIS NOTICE OF ALLOWANCE IS NOT A GRANT OF PATENT RIGHTS. THIS APPLICATION IS SUBJECT TO WITHDRAWAL FROM ISSUE AT THE INITIATIVE OF THE OFFICE OR UPON PETITION BY THE APPLICANT. SEE 37 CFR 1.313 AND MPEP 1308.

THE ISSUE FEE AND PUBLICATION FEE (IF REQUIRED) MUST BE PAID WITHIN THREE MONTHS FROM THE MAILING DATE OF THIS NOTICE OR THIS APPLICATION SHALL BE REGARDED AS ABANDONED. THIS STATUTORY PERIOD CANNOT BE EXTENDED. SEE 35 U.S.C. 151. THE ISSUE FEE DUE INDICATED ABOVE DOES NOT REFLECT A CREDIT FOR ANY PREVIOUSLY PAID ISSUE FEE IN THIS APPLICATION. IF AN ISSUE FEE HAS PREVIOUSLY BEEN PAID IN THIS APPLICATION (AS SHOWN ABOVE), THE RETURN OF PART B OF THIS FORM WILL BE CONSIDERED A REQUEST TO REAPPLY THE PREVIOUSLY PAID ISSUE FEE TOWARD THE ISSUE FEE NOW DUE.

HOW TO REPLY TO THIS NOTICE:

I. Review the SMALL ENTITY status shown above.

If the SMALL ENTITY is shown as YES, verify your current SMALL ENTITY status:

A. If the status is the same, pay the TOTAL FEE(S) DUE shown above.

B. If the status above is to be removed, check box 5b on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and twice the amount of the ISSUE FEE shown above, or

If the SMALL ENTITY is shown as NO:

A. Pay TOTAL FEE(S) DUE shown above, or

B. If applicant claimed SMALL ENTITY status before, or is now claiming SMALL ENTITY status, check box 5a on Part B - Fee(s) Transmittal and pay the PUBLICATION FEE (if required) and 1/2 the ISSUE FEE shown above.

II. PART B - FEE(S) TRANSMITTAL, or its equivalent, must be completed and returned to the United States Patent and Trademark Office (USPTO) with your ISSUE FEE and PUBLICATION FEE (if required). If you are charging the fee(s) to your deposit account, section "4b" of Part B - Fee(s) Transmittal should be completed and an extra copy of the form should be submitted. If an equivalent of Part B is filed, a request to reapply a previously paid issue fee must be clearly made, and delays in processing may occur due to the difficulty in recognizing the paper as an equivalent of Part B.

III. All communications regarding this application must give the application number. Please direct all communications prior to issuance to Mail Stop ISSUE FEE unless advised to the contrary.

IMPORTANT REMINDER: Utility patents issuing on applications filed on or after Dec. 12, 1980 may require payment of maintenance fees. It is patentee's responsibility to ensure timely payment of maintenance fees when due.

PART B - FEE(S) TRANSMITTAL

Complete and send this form, together with applicable fee(s), to: Mail Mail Stop ISSUE FEE Commissioner for Patents P.O. Box 1450 Alexandria, Virginia 22313-1450

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| | | | | | | | | (Depositor's name) |
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| 09/691,419 | 10/17/2000 | | Gordon MacKa | ay | | | CISCP261 | 4308 |
| TITLE OF INVENTION | | | _ | | | | | |
| APPLN, TYPE | SMALL ENTITY | ISSUE FEE DUE | PUBLICATION FEE | DUE | PREV. PAID ISSUE | FEE | TOTAL FEE(S) DUE | DATE DUE |
| nonprovisional | NO | \$1440 | \$0 | | \$0 | | \$1440 | 12/17/2008 |
| EXAM | INER | ART UNIT | CLASS-SUBCLA | SS | | | | |
| HALIYUR, VI | ENKATESH N | 2619 | 370-254000 | | | | | |
| "Fee Address" ind PTO/SB/47; Rev 03-0 Number is required. 3. ASSIGNEE NAME A | ND RESIDENCE DATA less an assignee is ident h in 37 CFR 3.11. Com | " Indication form ned. Use of a Custon A TO BE PRINTED | ce or agents OR, all (2) the name of registered attorn 2 registered pate listed, no name v ON THE PATENT (prin | ernative a single ey or a nt attor will be tor type the pains an a | e firm (having as a gent) and the name meys or agents. If n printed. e) atent. If an assigne assignment. | memb s of u so nam | er a 2p to p to e is 3 | ocument has been filed for |
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| | s SMALL ENTITY state | us. See 37 CFR 1.27. | | | | | ITTY status. See 37 CI | |
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| Authorized Signature | | | | | Date | | | |
| Typed or printed name | | | | | Registration No | | | |
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PTOL-85 (Rev. 08/07) Approved for use through 08/31/2010.



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| APPLICATION NO. | F | TLING DATE | FIRST NAMED INVENTOR | ATTORNEY DOCKET NO. | CONFIRMATION NO. | | |
|------------------------|------|------------|-------------------------|----------------------|------------------|--|--|
| 09/691,419 | | 10/17/2000 | Gordon MacKay | CISCP261 | 4308 | | |
| 22434 | 7590 | 09/17/2008 | | EXAM | IINER | | |
| BEYER WEAVER LLP | | | | HALIYUR, VENKATESH N | | | |
| P.O. BOX 70250 | | | | ART UNIT | PAPER NUMBER | | |
| OAKLAND, CA 94612-0250 | | | | 2619 | | | |
| | | | DATE MAILED: 09/17/2008 | | | | |

Determination of Patent Term Adjustment under 35 U.S.C. 154 (b)

(application filed on or after May 29, 2000)

The Patent Term Adjustment to date is 1612 day(s). If the issue fee is paid on the date that is three months after the mailing date of this notice and the patent issues on the Tuesday before the date that is 28 weeks (six and a half months) after the mailing date of this notice, the Patent Term Adjustment will be 1612 day(s).

If a Continued Prosecution Application (CPA) was filed in the above-identified application, the filing date that determines Patent Term Adjustment is the filing date of the most recent CPA.

Applicant will be able to obtain more detailed information by accessing the Patent Application Information Retrieval (PAIR) WEB site (http://pair.uspto.gov).

Any questions regarding the Patent Term Extension or Adjustment determination should be directed to the Office of Patent Legal Administration at (571)-272-7702. Questions relating to issue and publication fee payments should be directed to the Customer Service Center of the Office of Patent Publication at 1-(888)-786-0101 or (571)-272-4200.

Notice of Allowability

| Application No. | Applicant(s) | | | |
|-------------------|---------------|--|--|--|
| 09/691,419 | MACKAY ET AL. | | | |
| Examiner | Art Unit | | | |
| VENKATESH HALIYUR | 2619 | | | |

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address-All claims being allowable, PROSECUTION ON THE MERITS IS (OR REMAINS) CLOSED in this application. If not included
herewith (or previously mailed), a Notice of Allowance (PTOL-85) or other appropriate communication will be mailed in due course. THIS
NOTICE OF ALLOWABILITY IS NOT A GRANT OF PATENT RIGHTS. This application is subject to withdrawal from issue at the initiative
of the Office or upon petition by the applicant. See 37 CFR 1.313 and MPEP 1308.

- This communication is responsive to RCE filed on 07/03/2008.
- The allowed claim(s) is/are 22-28,33-39 and 44.
- Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some* c) None of the:
 - 1.

 Certified copies of the priority documents have been received.
 - Certified copies of the priority documents have been received in Application No.
 - Copies of the certified copies of the priority documents have been received in this national stage application from the International Bureau (PCT Rule 17.2(a)).
 - * Certified copies not received: _____

Applicant has THREE MONTHS FROM THE "MAILING DATE" of this communication to file a reply complying with the requirements noted below. Failure to timely comply will result in ABANDONMENT of this application.
THIS THREE-MONTH PERIOD IS NOT EXTENDABLE.

- 4. A SUBSTITUTE OATH OR DECLARATION must be submitted. Note the attached EXAMINER'S AMENDMENT or NOTICE OF INFORMAL PATENT APPLICATION (PTO-152) which gives reason(s) why the oath or declaration is deficient.
- 5. CORRECTED DRAWINGS (as "replacement sheets") must be submitted.
 - (a) 🔲 including changes required by the Notice of Draftsperson's Patent Drawing Review (PTO-948) attached
 - 1) hereto or 2) to Paper No./Mail Date
 - (b) including changes required by the attached Examiner's Amendment / Comment or in the Office action of Paper No./Mail Date _____.

Identifying indicia such as the application number (see 37 CFR 1.84(c)) should be written on the drawings in the front (not the back) of each sheet. Replacement sheet(s) should be labeled as such in the header according to 37 CFR 1.121(d).

 DEPOSIT OF and/or INFORMATION about the deposit of BIOLOGICAL MATERIAL must be submitted. Note the attached Examiner's comment regarding REQUIREMENT FOR THE DEPOSIT OF BIOLOGICAL MATERIAL.

Attachment(s)

- 1. Notice of References Cited (PTO-892)
- Notice of Draftperson's Patent Drawing Review (PTO-948)
- Information Disclosure Statements (PTO/SB/08), Paper No./Mail Date
- Examiner's Comment Regarding Requirement for Deposit of Biological Material
- 5. Notice of Informal Patent Application
- Interview Summary (PTO-413), Paper No./Mail Date ______.
- 7. X Examiner's Amendment/Comment
- 8. X Examiner's Statement of Reasons for Allowance
- 9. ☐ Other .

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EXAMINER'S AMENDMENT

1. An examiner's amendment to the record appears below. Should the changes and/or additions be unacceptable to applicant, an amendment may be filed as provided by 37 CFR 1.312. To ensure consideration of such an amendment, it MUST be submitted no later than the payment of the issue fee.

Authorization for this examiner's amendment was given in a telephone interview with Kevin M. Donnelly (Reg No: 61,643) on 03/25/2008.

The application has been amended as follows:

In claims:

a. Following claims have been amended to recite as below:

Claim 22: A method for handling a communication in a network of nodes, each node having an associated identification that is unique from other identifications in the network of nodes, the method comprising:

receiving, at a first node, a communication from a second node, wherein the communication includes an identification;

determining, at the first node, whether the identification included in the communication is closer to, equidistant from, or further from a

predetermined identification value than an <u>identification</u> associated with the first node:

if the identification included in the communication is closer to the predetermined identification value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification that was included in the communication received from the second node associated with the first node:

if the identification included in the communication is further from the predetermined identification value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification associated with the first node that was included in the communication received from the second node; and

if the identification included in the communication is equidistant from the predetermined <u>identification</u> value as the identification associated with the first node, concluding that a loop exists in the network <u>and appointing</u> a node as a master loop breaker.

Claim 33: An apparatus for handling a communication in a network of nodes, each node having an associated identification that is unique from other identifications in the network of nodes, the apparatus

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comprising:

one or more components to configured to:

receive, at a first node, a communication from a second node, wherein the communication includes an identification:

determine, at the first node, whether the identification included in the communication is closer to, equidistant from, or further from a predetermined <u>identification</u> value than an identification associated with the first node:

if the identification included in the communication is closer to the predetermined identification value than the identification associated with the first node, send, from the first node to a third node, a communication including the identification that was included in the communication received from the second node associated with the first node;

if the identification included in the communication is further from the predetermined <u>identification</u> value than the identification associated with the first node, send, from the first node to a third node, a communication including the identification <u>associated with the first node</u> that was included in the communication received from the second node; and

if the identification included in the communication is equidistant from the predetermined <u>identification</u> value as the identification associated with the first node, conclude that a loop exists in the network <u>and appoint a</u> node as a master loop breaker.

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Claim 44: An apparatus for handling a communication in a network of nodes, each node having an associated identification that is unique from other identifications in the network of nodes, the method comprising:

means for receiving, at a first node, a communication from a second node, wherein the communication includes an identification;

means for determining, at the first node, whether the identification included in the communication is closer to, equidistant from, or further from a predetermined <u>identification</u> value than an identification associated with the first node:

means for:

if the identification included in the communication is closer to the predetermined <u>identification</u> value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification <u>that was included in the communication received from the second node</u> associated with the first node:

if the identification included in the communication is further from the predetermined <u>identification</u> value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification <u>associated with</u> the first node that was included in the communication received from

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the second node; and

if the identification included in the communication is

equidistant from the predetermined identification value as the

identification associated with the first node, concluding that a loop

exists in the network and appointing a node as a master loop

breaker.

b. Following claims have been canceled:

Claim: 29-32 (Canceled).

Claim: 40-43 (Canceled).

2. The following is an examiner's statement of reasons for allowance:

A request for continued examination under 37 CFR 1.114, including the

fee set forth in 37 CFR 1.17(e), was filed in this application after allowance

or after an Office action under Ex Parte Quayle, 25 USPQ 74, 453 O.G.

213 (Comm'r Pat. 1935). Since this application is eligible for continued

examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e)

has been timely paid, prosecution in this application has been reopened

pursuant to 37 CFR 1.114. Applicant's submission filed on 07/03/2008 has been entered

- The information disclosure statement (IDS) submitted on 07/03/2008 was considered by the examiner.
- Claims 22-28, 33-39, 44 are allowed over prior art. Claims 1-21, 29-32, 40-43 are canceled.
 - The prior art fails to teach or fairly suggest the following limitations recited in independent claims 22, 33, 44 for method, apparatus and means,

"if the identification included in the communication is closer to the predetermined identification value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification that was included in the communication received from the second node:

if the identification included in the communication is further from the predetermined identification value than the identification associated with the first node, sending, from the first node to a third node, a communication including the identification associated with the first node; and

if the identification included in the communication is equidistant from the predetermined identification value as the identification associated with Art Unit: 2619

the first node, concluding that a loop exists in the network and appointing a node as a master loop breaker."

Any comments considered necessary by applicant must be submitted no later than the payment of the issue fee and, to avoid processing delays, should preferably accompany the issue fee. Such submissions should be clearly labeled "Comments on Statement of Reasons for Allowance."

4. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Venkatesh Haliyur whose telephone number is 571-272-8616. The examiner can normally be reached on Monday thru Friday 8:30AM to 4:30PM.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Edan Orgad can be reached on 571-272-7884. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center

/Venkatesh Haliyur/

Examiner, Art Unit 2619

/Edan Orgad/

Supervisory Patent Examiner, Art Unit 2619

(EBC) at 866-217-9197 (toll-free).